PATENT APPLICATION

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

re application of

Docket No: Q72568

Takashi UDAGAWA

Appln. No.: 10/689,024

Group Art Unit: 2826

Confirmation No.: 4493

Examiner: Minh Loan Tran

Filed: October 21, 2003

For:

GROUP-III NITRIDE SEMICONDUCTOR DEVICE, PRODUCTION METHOD

THEREOF AND LIGHT-EMITTING DIODE

INFORMATION DISCLOSURE STATEMENT UNDER 37 C.F.R. §§ 1.97 and 1.98

Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

Sir:

In accordance with the duty of disclosure under 37 C.F.R. § 1.56, Applicant hereby notifies the U.S. Patent and Trademark Office of the documents which are listed on the attached PTO/SB/08 A & B (modified) form and/or listed herein and which the Examiner may deem material to patentability of the claims of the above-identified application.

One copy of each of the listed documents is submitted herewith, except for the following: U.S. patents and/or U.S. patent publications; and co-pending non-provisional U.S. applications filed after June 30, 2003.

The present Information Disclosure Statement is being filed (without a Statement Under 37 C.F.R § 1.97(e)) after the later of three months from the application's filing date and the mailing date of the first Office Action on the merits, but before a Final Office Action, Notice of

INFORMATION DISCLOSURE STATEMENT

U.S. Application No.: 10/689,024

Q72568

Allowance, or an action that otherwise closes prosecution in the application (whichever is earlier), and therefore a check for the fee of \$180.00 under 37 C.F.R. § 1.17(p) is attached.

The submission of the listed documents is not intended as an admission that any such document constitutes prior art against the claims of the present application. Applicant does not waive any right to take any action that would be appropriate to antedate or otherwise remove any listed document as a competent reference against the claims of the present application.

The USPTO is directed and authorized to charge all required fees, except for the Issue Fee and the Publication Fee, to Deposit Account No. 19-4880. Please also credit any overpayments to said Deposit Account. A duplicate copy of this paper is attached.

Respectfully submitted,

Registration No. 33,276

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WASHINGTON OFFICE

23373
CUSTOMER NUMBER

Date: May 27, 2005

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Substitute for Form 144	0 A & R/DTO			Complete if Known		
Substitute for Form 14	A COLLIN	ė		Application Number	10/689,024	
INFO	RMATION	DISCLOS	SURE	Confirmation Number	4493	
STATEMENT BY APPLICANT			ANT	Filing Date	October 21, 2003	
<u> </u>				First Named Inventor	Takashi UDAGAWA	
(use as many sheets as necessary)				Art Unit	2826	
				Examiner Name	Minh Loan Tran	
Sheet	l 1	of	1 1	Attorney Docket Number	072568	

			U.S.	PATENT DOCU	MENTS
	Cite	Document Nu	ımber	Publication Date MM-DD-YYYY	Name of Patentee or Applicant of Cited Document
	No.1	Number	Kind Code ² (if known)		
		US 6,069,021	3	05-30-2000	TERASHIMA et al.
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Examiner Cite Initials* No.1	Foreign Patent Document			Publication Date	Name of Patentee or		
	Country Code ³	Number ⁴	Kind Code ⁵ (if known)	MM-DD-YYYY	Applicant of Cited Document	Translation ⁶	
		JР	10-56202		02-24-1998	SHOWA DENKO KK	Abstract
		JР	55-3834		01-26-1980		Abstract
		JР	10-107315		04-24-1998	SHOWA DENKO KK	Abstract
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		NON PATENT LITERATURE DOCUMENTS			
Examiner Cite Initials* No.1		Include name of the author (in CAPITAL LETTERS), title of the article (when appropriate), title of the item (book, magazine, journal, serial, symposium, catalog, etc.), date, page(s), volume-issue number(s), publisher, city, and/or country where published.			
		Isamu AKASAKI (compiler), "Advanced Electronics Series, I-21, Group-III Nitride Semiconductor", 1st edition, pp. 288-289, Baifukan (December 8, 1999)	Abstract		
		Isamu AKASAKI et al.; "Effects of AlN Buffer Layer on Crystallographic Structure and on Electrical and Optical Properties of GaN and $Ga_{1-x}Al_xN$ ($0 < x \le 0.4$) Films Grown on Sapphire Substrate by MOVPE"; Journal of Crystal Growth (the Netherlands); Vol. 98, pp. 209-219 (1989)			
		Isamu AKASAKI (compiler); "Advanced Electronics Series, I-21, Group-III Nitride Semiconductor"; 1st edition, pp. 211-213, Baifukan (December 8, 1999)	Abstract		

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Examiner Signature	Date Considered	

^{*}EXAMINER: Initial if reference considered, whether or not citation is in conformance with MPEP 609. Draw line through citation if not in conformance and not considered. Include copy of this form with next communication to applicant.

¹Applicant's unique citation designation number (optional). ²See Kind Codes of USPTO Patent Documents at www.uspto.gov, MPEP 901.04 or in the comment box of this document. ³ Enter Office that issued the document, by the two-letter code (WIPO Standard ST. 3). ⁴For Japanese patent documents, the indication of the year of the reign of the Emperor must precede the serial number of the patent document. ⁵Kind of document by the appropriate symbols as indicated on the document under WIPO Standard ST. 16 if possible. ⁶ Applicant is to indicate here if English language Translation is attached.